

DQA: _____ Date: _____



WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed: _____ Date: _____

Work Order update only ☐

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Date :		Step #:		QTY Effective :			MRB (QSI042) Approval																		
Description Work Order Deviation				Disposition			Completed By																		
30-SEP-2019 10:00 AM				30-SEP-2019 10:00 AM			Lead hand / Supervisor Approval Verification																		
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Work Order ID 152373***152373***

Page 2

Monday, October 24, 2016 11:17:20 AM

Item ID: D130-700-011

Accept

N900040100

Setup Start

NS1

Revision ID:

Stop

NS2

Item Name: EC130 Bearpaws

Start Date: 10/24/2016 Start Qty: 1.00

1

Cust Item ID:

Required Date: 11/4/2016 Req'd Qty: 1.00

1

Customer:

Reference:

Approvals:

Process Plan:

Date:

Tooling:

Date:

Run Start

NR1

QC:

Date:

SPC (Y/N):

Date:

Stop

NR2Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run Hours

Tool ID

Tool #

Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

180

0.00

180

Packaging

Packaging

Memo

0.00

Identify and pack for shipping as per PPP D130-700-011

LOCATION: FG012

4X DAS
28
9-89DAS
27
9-89

JAN 19 2017

190

0.00

190

QC21- Final Inspection - Work Order Release

QC

Memo

0.02

Quality Control

DAS
21
9-89

JAN 20 2017

DAS
21
9-89

JAN 20 2017

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OTHER : _____																									

Picklist Print

Monday, October 24, 2016 11:17:24 AM

Page 1

Work Order ID: 152373

152373

Parent Item: D130-700-011

D130-700-011

Parent Item Name: EC130 Bearpaws

Start Date: 10/24/2016

Required Date: 11/4/2016

Start Qty: 1.00

Required Qty: 1.00

Comments: IPP RevA: New issue DD verified by:EC

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
D3167-1		Manufactured	No				Each	0.0000		28			
D3167-1									**	1545742	15484526	JAN 16 2017	DAS 27 9-89
Bearpaw													
AN4-12A		Purchased	No			170	Each	170.0000	4	4 16			
AN4-12A									**			JAN 16 2017	DAS 6 9-89
Bolt													
					<u>Location</u>	<u>Loc Qty</u>	<u>Loc Code</u>						
					FG	10							
					120423	10							
					ST344	160							
					m134606	35							
					m135704	125				16			
AN4-15A		Purchased	No			170	Each	1,033.000	8	8 32			
AN4-15A									**			JAN 16 2017	DAS 6 9-89
Bolt													
					<u>Location</u>	<u>Loc Qty</u>	<u>Loc Code</u>						
					GA	26							
					120449	26							
					over003	1000							
					m135859	1000				32			
					ST343	7							
					m135774	7							

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Root Cause		FAULT CATEGORY							
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Design ☐	☐	Operator ☐	Bending ☐	Set-up ☐	Folio/Program ☐	Outside Dimensions ☐			
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Material ☐	☐	Use for Testing ☐	Cuffs ☐	Contamination ☐	Out of Sequence ☐	Part Moved ☐			
Internal Transport ☐	☐	Poor Information ☐	Crushing ☐	Countersink ☐	Off-set ☐	Drawing ☐			
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Monday, October 24, 2016 11:17:24 AM

Page 2

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Parent Item: D130-700-011

D130-700-011

Parent Item Name: EC130 Bearpaws

Start Date: 10/24/2016

Required Date: 11/4/2016

Start Qty: 1.00

Required Qty: 1.00

D2182B060

Manufactured No

170 Each

56.0000

4 4 16

D2182B060

Clamp Cushion Black 6.0 "Long

DAS
28
9-89

Location

Loc Qty

Loc Code

FG

15

93429

15

ST639

41

151626

41

D2274

Manufactured No

170 Each

201.0000

12 12 48

D2274

Radius Block

DAS
28
9-89

Location

Loc Qty

Loc Code

FG

12

86855

12

ST006

189

150353

34

150676

155

D2519

Manufactured No

170 Each

67.0000

4 4 16

D2519

Clamp

DAS
28
9-89

Location

Loc Qty

Loc Code

ST542

67

150142

7

150835

60

D2529

Manufactured No

170 Each

603.0000

12 12 48

D2529

Washer

DAS
28
9-89

Location

Loc Qty

Loc Code

ST008

603

150080

500

150996

103

Monday, October 24, 2016 11:17:24 AM

Shop Packet Print

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Picklist Print

Monday, October 24, 2016 11:17:24 AM

Page 3

Work Order ID: 152373

152373

Parent Item: D130-700-011

D130-700-011

Parent Item Name: EC130 Bearpaws

Start Date: 10/24/2016

Required Date: 11/4/2016

Start Qty: 1.00

Required Qty: 1.00

D3171-1

Manufactured No

170 Each

16.0000

D3171-1

Angle Bracket

DAS
28
9-89

Location

Loc Qty

Loc Code

ST019

16

143608

16

MS21042L4

Purchased No

170 Each

2,214.000

MS21042L4

Nut

DAS
28
9-89

Location

Loc Qty

Loc Code

FP001

34

m133363

34

GA

260

m135058

260

OVER007

1500

m135774

500

m135864

1000

ST303

420

m135704

420

4 412

**

154816x4

JAN 16 2017

DAS 6 27 9-89

10 12

12 12-48

**

JAN 16 2017

DAS 6 27 9-89

135979

DQA: _____ Date: _____



WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed: _____ Date: _____

Work Order update only ☐

Work Order: _____ Part No. _____ NCR No. _____	DISPOSITION Rework ☐ Scrap ☐ Use-as-is ☐ Suspected Unapproved ☐	AGAINST DEPARTMENT/PROCESS Skid-tube ☐ Machining ☐ Thermoforming ☐ Large Fab ☐ Cross tube ☐ Small Fab ☐ Finishing ☐ Composite ☐ Water Jet ☐ Prod. Eng. Coor. ☐ Rec/Store/Packaging ☐ Supplier ☐ Engineering ☐ Quality ☐ Other ☐			
Date : _____	Step #: _____	QTY Effective : _____		MRB (QSI042) Approval	
Description Work Order Deviation			Disposition		
			Completed By		
			Lead hand / Supervisor Approval Verification		
			QC / QA Coordinator Approval		
Root Cause Environment ☐ Design ☐ Doc/Data ☐ Equip/Tooling ☐ Handling/Pre ☐ Material ☐ Internal Transport ☐ Tribal Knowledge ☐ LOA ☐ Substation ☐ Past Expiry Date ☐ Misidentified ☐ No Re-verification ☐ Operator ☐ Offset/Setup ☐ Supplier ☐ Training ☐ Use for Testing ☐ Poor Information ☐ Rushing ☐ Product Improvement ☐ Process Improvement ☐ Manufacturing Process ☐ Past Due ☐			FAULT CATEGORY Pressure/Forced ☐ Bending ☐ Centre Not Concentric ☐ Cracks ☐ Crimp/Kink/Ripple/Wave ☐ Cuffs ☐ Crushing ☐ Heat Treat ☐ Wave/Twist in Tube ☐ Marks/Chatter ☐ Temperature/Cure ☐ Set-up ☐ BOM/Route ☐ Broken/Damage/Defect ☐ Inspection Incomplete/Unqualified ☐ Contamination ☐ Countersink ☐ Cut Too Short ☐ Instructions Incomplete/Unclear ☐ Drill Holes ☐ Power Loss/Surge ☐ Folio/Program ☐ Grain ☐ Weld ☐ Wrong Stock Pulled ☐ Out of Sequence ☐ Off-set ☐ Mislabeled ☐ Fit/Function ☐ Misaligned/off center ☐ Positioned Wrong ☐ Outside Dimensions ☐ Over/Under tolerance ☐ Part Incorrect ☐ Part Lost/Missing ☐ Part Moved ☐ Drawing ☐ Finish ☐ Misread ☐ Turning Sequence ☐		
OTHER : ☐					

Picklist Print

Monday, October 24, 2016 11:17:24 AM

Work Order ID: 152373

152373

Parent Item: D130-700-011

D130-700-011

Parent Item Name: EC130 Bearpaws

Start Date: 10/24/2016

Required Date: 11/4/2016

Start Qty: 1.00

Required Qty: 1.00

NAS1149D0463J

Purchased

No

170

Each

2,230.000

12

1248

NAS1149D0463.J

Washer

**

JAN 16 2017

DAS 27
6
9-89

DAS
28
9-89

Location

Loc Qty

Loc Code

cnc	200	
M135671	200	
GA	135	
M134508	32	
M135056	103	
ST260a	1000	
M135767	1000	
ST263	895	
M135530	95	
M135671	800	

136044

DQA: _____ Date: _____



WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed: _____ Date: _____

Work Order update only ☐

Work Order: _____ Part No. _____ NCR No. _____	DISPOSITION Rework ☐ Scrap ☐ Use-as-is ☐ Suspected Unapproved ☐	AGAINST DEPARTMENT/PROCESS <table style="width:100%; border: none;"> <tr> <td style="width:15%;">Skid-tube ☐</td> <td style="width:15%;">Cross tube ☐</td> <td style="width:15%;">Water Jet ☐</td> <td style="width:15%;">Engineering ☐</td> </tr> <tr> <td>Machining ☐</td> <td>Small Fab ☐</td> <td>Prod. Eng. Coor. ☐</td> <td>Quality ☐</td> </tr> <tr> <td>Thermoforming ☐</td> <td>Finishing ☐</td> <td>Rec/Store/Packaging ☐</td> <td>Other ☐</td> </tr> <tr> <td>Large Fab ☐</td> <td>Composite ☐</td> <td>Supplier ☐</td> <td></td> </tr> </table>				Skid-tube ☐	Cross tube ☐	Water Jet ☐	Engineering ☐	Machining ☐	Small Fab ☐	Prod. Eng. Coor. ☐	Quality ☐	Thermoforming ☐	Finishing ☐	Rec/Store/Packaging ☐	Other ☐	Large Fab ☐	Composite ☐	Supplier ☐	
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						Lead hand / Supervisor Approval Verification															
			QC / QA Coordinator Approval																		

Root Cause				FAULT CATEGORY			
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Design ☐		Operator ☐		Bending ☐		Set-up ☐	
Doc/Data ☐		Offset/Setup ☐		Centre Not Concentric ☐		BOM/Route ☐	
Equip/Tooling ☐		Supplier ☐		Cracks ☐		Broken/Damage/Defect ☐	
Handling/Pre ☐		Training ☐		Crimp/Kink/Ripple/Wave ☐		Inspection Incomplete/Unqualified ☐	
Material ☐		Use for Testing ☐		Cuffs ☐		Contamination ☐	
Internal Transport ☐		Poor Information ☐		Crushing ☐		Countersink ☐	
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Substation ☐		Process Improvement ☐		Marks/Chatter ☐		Drill Holes ☐	
Past Expiry Date ☐		Manufacturing Process ☐		OTHER : _____			
Misidentified ☐		Past Due ☐					

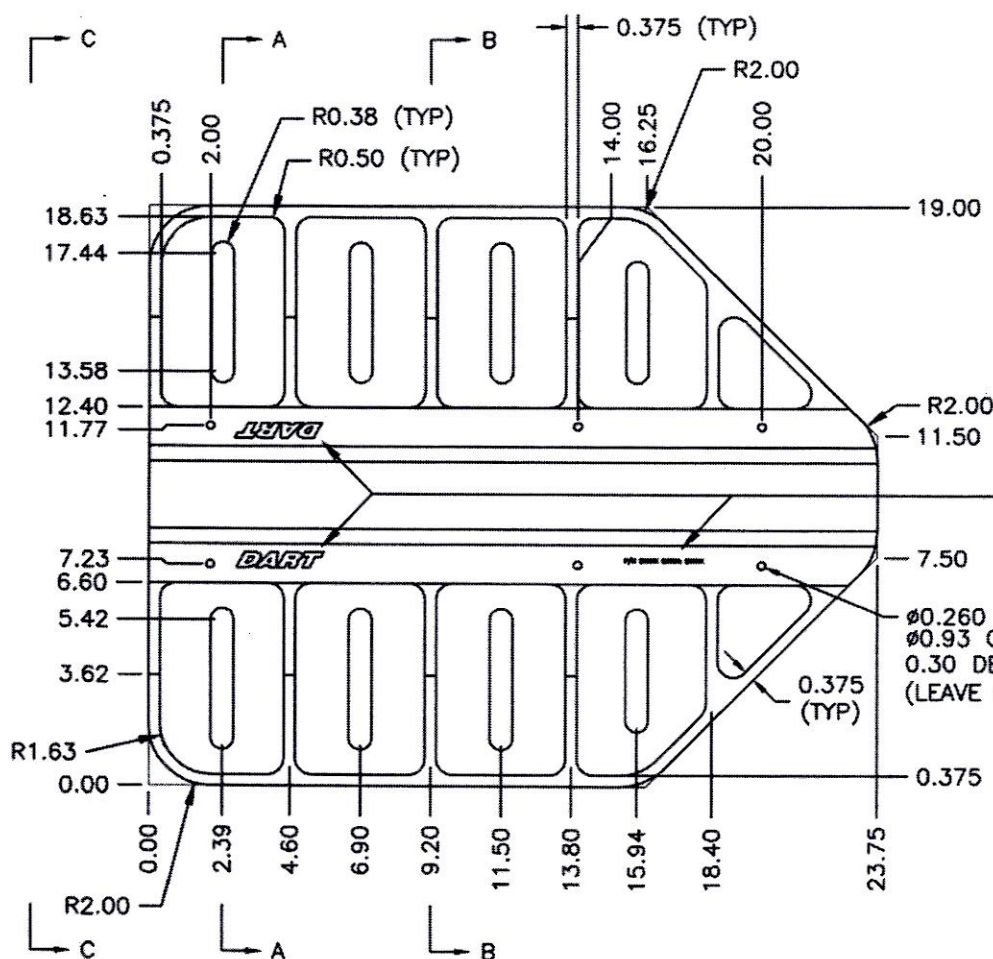
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DESIGN 	DRAWN BY 	DART AEROSPACE LTD HAMKESBURY, ONTARIO, CANADA	
CHECKED 	APPROVED 	DRAWING NO.	REV. A
		D3167	SHEET 1 OF 2
DATE		TITLE	SCALE
02.10.08		BEARPAW	1:6
A	02.10.08	NEW ISSUE	
A1	02.12.17	5.80 was 5.50	

ENGRAVE LOGO TO MAX
DEPTH OF 0.012. ENGRAVE
PART AND BATCH NUMBERS
TO MAX DEPTH OF 0.010.
(TYPICAL LOCATION AS
ILLUSTRATED)

SHOP COPY
RETURN TO
ENGINEERING
UNCONTROLLED COPY
SUBJECT TO AMENDMENT
WITHOUT NOTICE
WORK ORDER
NO. 152373.MC

NO. 152373 MLS
16-10-24



D3167-1

MATERIAL: UHMW BLACK PER SPEC CONTROL DRAWING D2689
1.00 THICK (MACHINE TO 0.950)
TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED

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DQA: _____ Date: _____

WORK ORDER NON-CONFORMANCE / UPDATE



QA Closed: _____ Date: _____

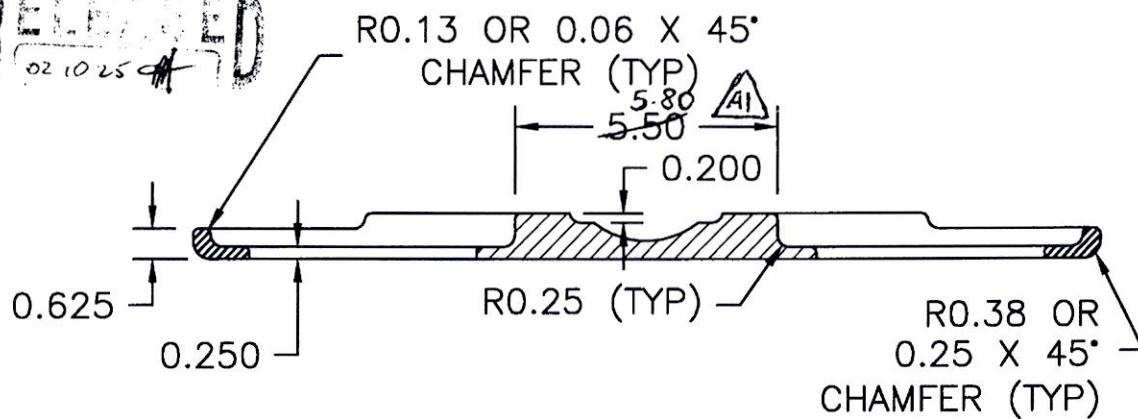
Work Order update only ☐

Work Order: _____ Part No. _____ NCR No. _____		DISPOSITION Rework ☐ Scrap ☐ Use-as-is ☐ Suspected Unapproved ☐		AGAINST DEPARTMENT/PROCESS Skid-tube ☐ Machining ☐ Thermoforming ☐ Large Fab ☐ Cross tube ☐ Small Fab ☐ Finishing ☐ Composite ☐ Water Jet ☐ Prod. Eng. Coord. ☐ Rec/Store/Packaging ☐ Supplier ☐ Engineering ☐ Quality ☐ Other ☐					
Date :		Step #:		QTY Effective :			MRB (QSI042) Approval Completed By _____ Lead hand / Supervisor Approval Verification _____ QC / QA Coordinator Approval _____		
Description Work Order Deviation				Disposition					
Root Cause Environment ☐ Design ☐ Doc/Data ☐ Equip/Tooling ☐ Handling/Pre ☐ Material ☐ Internal Transport ☐ Tribal Knowledge ☐ LOA ☐ Substation ☐ Past Expiry Date ☐ Misidentified ☐ No Re-verification ☐ Operator ☐ Offset/Setup ☐ Supplier ☐ Training ☐ Use for Testing ☐ Poor Information ☐ Rushing ☐ Product Improvement ☐ Process Improvement ☐ Manufacturing Process ☐ Past Due ☐		FAULT CATEGORY Pressure/Forced ☐ Bending ☐ Centre Not Concentric ☐ Cracks ☐ Crimp/Kink/Ripple/Wave ☐ Cuffs ☐ Crushing ☐ Heat Treat ☐ Wave/Twist in Tube ☐ Marks/Chatter ☐ Temperature/Cure ☐ Set-up ☐ BOM/Route ☐ Broken/Damage/Defect ☐ Inspection Incomplete/Unqualified ☐ Contamination ☐ Countersink ☐ Cut Too Short ☐ Instructions Incomplete/Unclear ☐ Drill Holes ☐ Power Loss/Surge ☐ Folio/Program ☐ Grain ☐ Weld ☐ Wrong Stock Pulled ☐ Out of Sequence ☐ Off-set ☐ Mislabeled ☐ Fit/Function ☐ Misaligned/off center ☐ Positioned Wrong ☐ Outside Dimensions ☐ Over/Under tolerance ☐ Part Incorrect ☐ Part Lost/Missing ☐ Part Moved ☐ Drawing ☐ Finish ☐ Misread ☐ Turning Sequence ☐							
		OTHER : ☐							

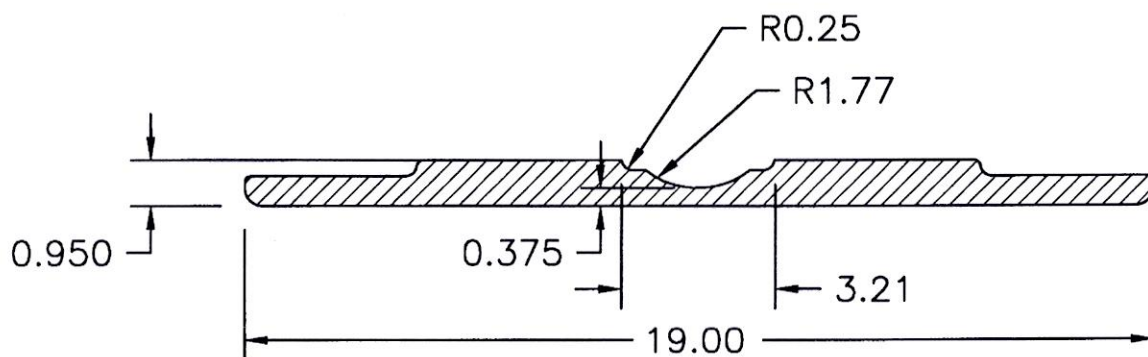


DESIGN 	DRAWN BY 	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
CHECKED 	APPROVED 	DRAWING NO. D3167	REV. A SHEET 2 OF 2
DATE 02.10.08		TITLE BEARPAW	SCALE 1:4

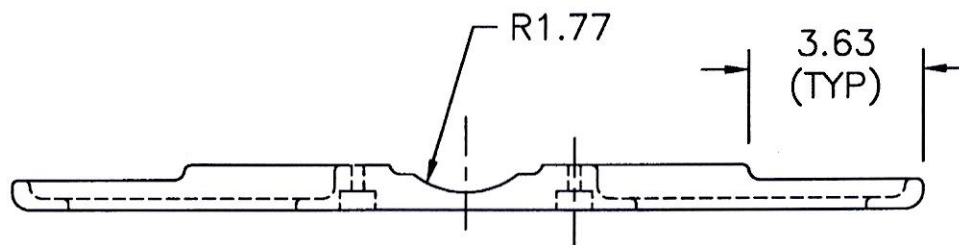
RELEASED
02 10 25



SECTION A-A



SECTION B-B



SECTION C-C

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Work Order update only ☐

Work Order: _____		DISPOSITION		AGAINST DEPARTMENT/PROCESS					
Part No. _____		Rework ☐		Skid-tube ☐	Cross tube ☐	Water Jet ☐	Engineering ☐		
NCR No. _____		Scrap ☐		Machining ☐	Small Fab ☐	Prod. Eng. Coord. ☐	Quality ☐		
		Use-as-is ☐		Thermoforming ☐	Finishing ☐	Rec/Store/Packaging ☐	Other ☐		
		Suspected Unapproved ☐		Large Fab ☐	Composite ☐	Supplier ☐			
Date :		Step #:		QTY Effective :				MRB (QSI042) Approval	
Description Work Order Deviation				Disposition				Completed By	
								Lead hand / Supervisor Approval Verification	
								QC / QA Coordinator Approval	
Root Cause		FAULT CATEGORY							
Environment ☐	No Re-verification ☐	Pressure/Forced ☐	Temperature/Cure ☐	Power Loss/Surge ☐	Positioned Wrong ☐				
Design ☐	Operator ☐	Bending ☐	Set-up ☐	Folio/Program ☐	Outside Dimensions ☐				
Doc/Data ☐	Offset/Setup ☐	Centre Not Concentric ☐	BOM/Route ☐	Grain ☐	Over/Under tolerance ☐				
Equip/Tooling ☐	Supplier ☐	Cracks ☐	Broken/Damage/Defect ☐	Weld ☐	Part Incorrect ☐				
Handling/Pre ☐	Training ☐	Crimp/Kink/Ripple/Wave ☐	Inspection Incomplete/Unqualified ☐	Wrong Stock Pulled ☐	Part Lost/Missing ☐				
Material ☐	Use for Testing ☐	Cuffs ☐	Contamination ☐	Out of Sequence ☐	Part Moved ☐				
Internal Transport ☐	Poor Information ☐	Crushing ☐	Countersink ☐	Off-set ☐	Drawing ☐				
Tribal Knowledge ☐	Rushing ☐	Heat Treat ☐	Cut Too Short ☐	Mislabeled ☐	Finish ☐				
LOA ☐	Product Improvement ☐	Wave/Twist in Tube ☐	Instructions Incomplete/Unclear ☐	Fit/Function ☐	Misread ☐				
Substation ☐	Process Improvement ☐	Marks/Chatter ☐	Drill Holes ☐	Misaligned/off center ☐	Turning Sequence ☐				
Past Expiry Date ☐	Manufacturing Process ☐								
Misidentified ☐	Past Due ☐	OTHER :							

5 PARTS LIST

Qty -011	Qty -021	Part Number	Description
X		D130-700-011	BEARPAW INSTALLATION
	X	D130-700-021	WEARPLATE KIT
4		D2182B060	Rubber Cushion
12		D2274	Radius Block
12		D2529	Washer
4		D2519	Clamp
2		D3167-1	Bearpaw
4		D3171-1	Angle
	2	D3862-041	Wearplate
4	4	AN4-12A	Bolt
8	8	AN4-15A	Bolt
12	12	NAS1149D0463J	Washer
12	12	MS21042L4	Nut (or MS21042-4)